

## Abstract

Characterizing for the invention are:

An inductive sensor unit with one or a plurality of sensor coils that are applied in a planar manner to a printed circuit board. Principle: A change in the inductance of the sensor coil by loss currents in the conductive actuator correlates to the position of the actuator in two ways: to the distance to the sensor coil and to the coverage of the sensor (when the distance is fixed). An inductive momentary-contact switch and an inductive position switch apparatus are presented with this basis.

Furthermore characterizing: Evaluation of the inductance e.g. of the momentary-contact switch as for inductive proximity switches by building the inductive sensors into an oscillating circuit. Alternatively the change in inductance can also be detected by a reactance measurement.

In position switch apparatus, a relative evaluation of the effect of adjacent sensor coils is undertaken.

See Fig. 6